

#### **FCC WARNING**

This equipment generates and uses radio frequency energy and if not installed and used properly, ie; in strict accordance with this instructions manual, may cause harmful interference to radio communications. This equipment has been tested and found to comply with the limits for a Class A computing device pursuant to Subpart J of Part 15 of the FCC rules, which are designed to provide reasonable protection against such interference when the equipment is operated in a commercial environment.

Operation of this equipment in a residential environment is likely to cause interference in which case the user, at his own expense, will be required to take whatever measures are necessary to correct the interference.

#### **FBI WARNING**

Federal law provides severe civil and criminal penalties for the unauthorized reproduction, distribution, or exhibition of copyrighted audio-visual works and video games. The Federal Bureau of Investigation investigates allegations of criminal copyright infringement.

#### COPYRIGHT NOTICE

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#### **ENVIRONMENTAL DATA**

This product is intended for use indoor use only, power requirements are 105–125 volts AC, 50–60 hz, and requires a 3 wire grounded outlet.

#### **SERVICE PROCEDURES**

To obtain replacement parts and technical service, contact the authorized Data East Distributor in your area. If you require referral or further technical assistance, you may contact Data East's Customer Service department during the hours of 8:00 am to 5:00 pm Pacific Time at (408) 286-7074.

VIGILANTETM

### UPRIGHT MODEL

### SERVICE & OPERATION MANUAL

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#### A. Installation and Set-Up.

NOTE: There are two models of the Vigilante<sup>TM</sup> upright video game. The first release version had a detachable control panel box and can be identified by a curved Marquee Plex. The second release utilizes a conventional cabinet that has the control panel mounted to the cabinet. If you have a second release game, skip to step 4 below.

- 1. Remove the shipping screws to remove the Rear Access Door using the key supplied. The 2 bolts used to hold the Control Panel to the rear access door during shipment are also used to mount the control panel to the cabinet. The two remaining bolts required can be found threaded into T-nuts in the control panel. Remove the Control Panel from the back door at this time.
- 2. Locate the keys in the package on the front of the cabinet, open the Coin Door. The control panel has two (2) retaining clamps that hold down the hinged section of the panel. Release the clamps at this time. Position the control panel on the front of the cabinet. Raise up the hinged section of the panel and reach inside the cabinet to start threading in the four mounting bolts. Thread in the bolts until they are finger tight. Using a ratchet with a 7/16" socket, tighten the mounting bolts. These may be easier to reach from the rear of the cabinet.
- 3. Plug the 12 pin Molex connector from the control panel into the Main Harness. Close the Control Panel and secure with the clamps.
- 4. Check the Main Harness for loose or unplugged connectors, and check for secure mounting of the monitor, power supply, and game pcb. Stabilize the cabinet using the leg levelers in the floor of the cabinet to prevent the game from rocking.
- 5. The selectable options have been pre-set at the factory for optimum player appeal, however, refer to Chapter 2, Section A; Dip Switch Options in this manual to set the game up for special requirements.
- 6. Remove the power cord from the inside of the cabinet and insert the strain relief plate into the slot at the bottom of the rear access door opening. Plug the AC cord into a grounded 117 VAC outlet and flip the power switch to the ON position. Allow 2 to 3 minutes for the monitor to warm up and check for proper demonstration mode video on the screen. Insert the proper coinage into a coin slot and start a game. Check for proper operation of all joystick controls and switches.

# 2. GAME INFORMATION

### A. Game Options.

The game options can be changed via 2 banks of dip-switches on the game PCB set. Be certain to remove power to the game when changing settings.

# DIP SWITCH 1:

ITEM	ACTION	1	2	3	4	5	6	7	8
NUMBER OF THREE (3):		OFF	OFF				·		
FIGHTERS	TWO (2):	ON	OFF						
FOUR (4):		OFF	ON						
	FIVE (5):	ON	ON						
DIFFICULTY NORMAL:				OFF					
2000000	HARD:			ON		·			
1	DECREASE OF NORMAL:				OFF				
ENERGY	FAST:				ON				
MODE COIN	1 COIN = 1 CREDIT:					OFF	OFF		
2	2 COIN = 1 CREDIT:					ON	OFF		
2	3 COIN = 1 CREDIT: 5 COIN = 1 CREDIT:					OFF	ON		
						ON	ON		
	1 COIN = 2 CREDIT: 1 COIN = 3 CREDIT:							OFF	OFF
	1 COIN = 5 CREDIT:							ON	OFF
	1 COIN = 6 CREDIT:							OFF	ON
COIN	1 COIN = 0 CREDIT:					OFF	OFF	ON OFF	ON OFF
MODE	2 COIN = 1 CREDIT:					ON	OFF	OFF	OFF
1	3 COIN = 1 CREDIT:					OFF	ON	OFF	OFF
	4 COIN = 1 CREDIT:					ON	ON	OFF	OFF
	5 COIN = 1 CREDIT:					OFF	OFF	ON	OFF
	6 COIN = 1 CREDIT:					ON	OFF	ON	OFF
	1 COIN = 2 CREDIT:					OFF	ON	ON	OFF
	1 COIN = 3 CREDIT:					ON	ON	ON	OFF
:	1 COIN = 4 CREDIT:					OFF	OFF	OFF	ON
	1 COIN = 5 CREDIT:					ON	OFF	OFF	ON
	1 COIN = 6 CREDIT:					OFF	ON	OFF	ON
	2 COIN = 3 CREDIT:					ON	ON	OFF	ON
	3 COIN = 2 CREDIT:					OFF	OFF	ON	ON
	5 COIN = 3 CREDIT:					ON	OFF	ON	ON
	8 COIN = 3 CREDIT:					OFF	ON	ON	ON
	FREE PLAY:					ON	ON	ON	ON

#### DIP SWITCH 2:

ITEM ACTIO	N	1	2	3	4	5	6	7	8
FLIP PICTURE	NO: YES:	OFF ON					<del></del>	<del> ,</del>	
CABINET TYPE	TABLE: UPRIGHT:		OFF ON					··	
COIN MODE	MODE 1: MODE 2:			OFF ON					
SOUND IN DEMO MODE	YES: NO:				OFF ON				
BUY-IN MODE	YES: NO:			<u> </u>	, <del></del> .	OFF ON			
DEMO FREEZE MODE 2P=STOP 1P=CONTINUE	NO: YES:			·			OFF ON		
NO DEATH MODE	NO: YES:							OFF ON	
ALWAYS KEEP SWITCH 8	OFF								OFF

NOTE: For Coin 1 and Coin 2 = same value, use COIN MODE 1. For Coin 1 and Coin 2 = different value, use COIN MODE 2.

# B. Power-Up Self Test.

When power is turned on, the following test is conducted automatically:

- 1. RAM TEST
- ;tests system RAMs for read and write capability.
- 2. ROM TEST
- ;tests system ROMs for valid data.

The RAM test causes various video patterns to appear on the screen for several seconds, and then displays results of RAM and ROM test.

If a RAM fails the test, the screen will display an error message indicating the defective device.

If a ROM fails the test, the screen will display an error message indicating the defective device.

### C. System Adjustments.

The Volume Control, Coin Counter, and Service Switch are located on the Service Panel. The Service Panel is located inside the Coin Door, mounted on the wall of the cabinet on the left side.

The Coin Counter increments once for every coin dropped through either coin entry slots.

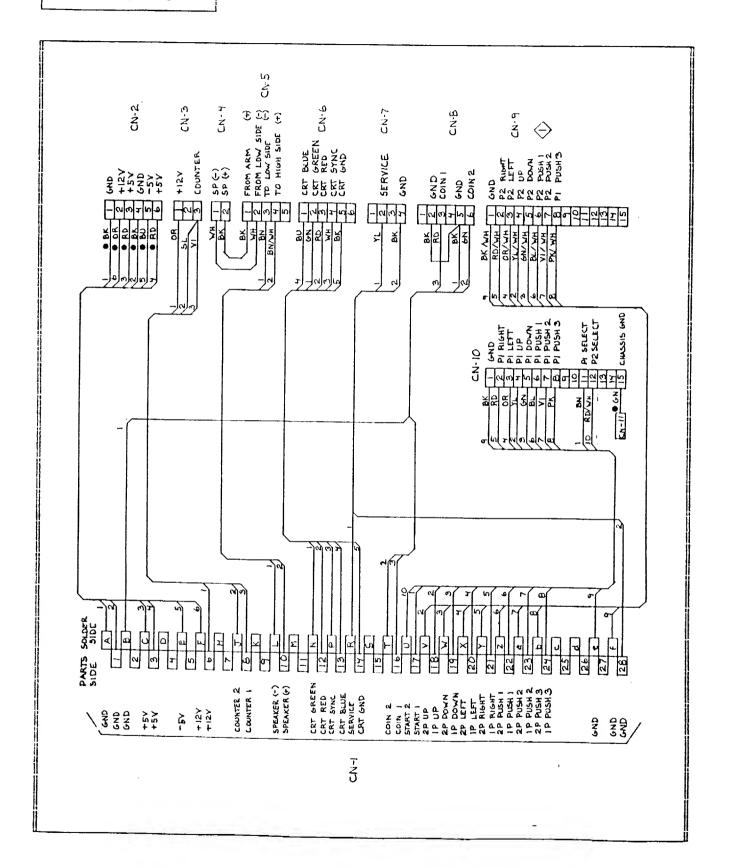
The Volume Control is used to adjust the overall loudness of the game sounds. NOTE: The volume control potentiometer on the Main pcb is preset to mid-range at the factory and should not be adjusted.

The Service Switch can be used to add credits to the game without incrementing the Coin Counter.

The fuses for the AC power line and the 12 volts for the Coin Door lamps are located on the Switch Bracket of the Power Supply assembly as is the ON/OFF switch. The fuse holders are labeled on the Switch Bracket as to the proper fuse ratings.

The +5 vdc adjustment level control is on the Power Supply's Switching Regulator is pre-set at the factory. In the event that an adjustment is required, measure the +5 volt level present at the game logic pcb with a Digital Multi-Meter while adjusting the output level of the Switching Regulator. The voltage must measure between +4.90 vdc to 5.10 vdc at the game logic pcb for proper operation.

WARNING: DANGEROUS VOLTAGE LEVELS ARE PRESENT IN AND AROUND THE MONITOR AND POWER SUPPLY ASSEMBLY. ADJUSTMENTS AND REPAIRS SHOULD BE ATTEMPTED ONLY BY QUALIFIED ELECTRONIC TECHNICIANS.



### 3. REPLACEMENT PARTS LIST

### FINAL ASSEMBLY

CABINET, EMPTY, 1US30, GREY	365-0012-00*
CABINET, EMPTY, 1US25, GREY	365-0010-00
CONTROL PANEL ASSY., VIGILANTE	510-0127-00
COIN DOOR, COIN CONTROL 2 SLOT, WIDE	510-0127-00*
COIN DOOR ASSY., COIN CONTROL	510-0004-00
	510-0120-00
POWER SUPPLY ASSY., 11AMP	510-0002-01
PCB SET, VIGILANTE	510-0124-00
· ·	535-0073-00*
PLEX, CLEAR, DISPLAY 23.75 X 23.75	660-0001-01
UNDERLAY CARD, VIGILANTE	810-0028-00
LABEL, INSTR. VIGILANTE 'A'	406-0088-01
LABEL, INSTR. VIGILANTE 'B'	406-0088-02
DECAL, SIDE, VIGILANTE	810-0028-00 406-0088-01 406-0088-02 820-0045-00 830-0036-00
PLEX, MARQUEE, VIGILANTE	830-0036-00
RETAINER. PLEX. MARQUEE. CURVED	535~0078-00*
RETAINER, PLEX, MARQUEE	535-0009-00
SPEAKER, 6 X 9" OVAL	031-0006-00
HARNESS, MAIN, JAMMA STD. U/R	036-0159-00

# CONTROL PANEL

CONTROL PANEL, BARE	535-0083-00
OVERLAY, CTRL PNL, VIGILANTE	800-0031-00
PUSHBUTTON, BLACK	350-0001-00
PUSHBUTTON, YELLOW	350-0001-04
PUSHBUTTON, BLUE	350-0001-06
HARNESS, CTRL PNL, 1P/2P, 2S.	036-0115-01
JOYSTICK, MONROE 4/8 WAY	450-0014-01

# MISCELLANEOUS PARTS

REGULATOR, 5V @ 11 A & 12V @ 1 A ISOLATION TRANSFORMER	001-0012-00 010-0001-00
NOISE FILTER	150-0004-00
SWITCH BRACKET W/FUSEHOLDERS	515-0004-00
HARNESS, DC OUT, 11A	036-0031-02
CASHBOX, 3 SLOT, METAL	535-0076-00*
CASHBOX BRACKET, LOCKING	535-0077-00*
CASHBOX, PLASTIC	545-0004-00
FIXTURE, LAMP, DUAL	170-0002-00
LAMP, 40 WATT, INCANDESCENT	165-0004-01
LAMP, 14 VDC .19 AMP WEDGE, #161	165-0009-00
SERVICE PANEL ASSY.	515-0029-00
COIN COUNTER, 12 VOLT	090-0002-00
POT, 50 Ω 12.5W, 1/8" SHAFT	123-0009-12
POT, 100 $\Omega$ 4W 1/4" SHAFT (replaces above)	123-0008-11
SWITCH, PUSHBUTTON, MOM.	180-0022-00

\* = FIRST RELEASE VERSION ONLY

# 4. PCB SCHEMATIC DIAGRAMS

M75-A-B PCB: PAGES 1/5 THRU 5/5

M75-B-A PCB: PAGES 1/7 THRU 7/7

